



# UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE  
United States Patent and Trademark Office  
Address: COMMISSIONER FOR PATENTS  
P.O. Box 1450  
Alexandria, Virginia 22313-1450  
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/508,955	10/04/2004	Yukihiko Minamida	80653(47762)	7477

21874 7590 01/22/2008  
EDWARDS ANGELL PALMER & DODGE LLP  
P.O. BOX 55874  
BOSTON, MA 02205

EXAMINER
----------

AFTERGUT, JEFF H

ART UNIT	PAPER NUMBER
----------	--------------

1791

MAIL DATE	DELIVERY MODE
-----------	---------------

01/22/2008

PAPER

**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

<b>Office Action Summary</b>	Application No. 10/508,955	Applicant(s) MINAMIDA ET AL.	
	Examiner Jeff H. Aftergut	Art Unit 1791	

**-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --**

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 17 December 2007.
- 2a) ☐ This action is **FINAL**.                      2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-4, 10-12, 15 and 16 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-4, 10-12, 15, 16 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
     Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
     Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All    b) ☐ Some \*    c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- |  |   |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)          | 4) <input type="checkbox"/> Interview Summary (PTO-413)           |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____                                      |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)          | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____  | 6) <input type="checkbox"/> Other: _____                          |

***Claim Rejections - 35 USC § 103***

1. The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.
2. Claims 4/1, 4/2, and 4/3 are rejected under 35 U.S.C. 103(a) as being unpatentable over the admitted prior art in view of Nichol and Nagata et al for the same reasons as expressed in the Final Rejection dated August 15, 2007.

It should be noted regarding the product by process claims herein that there is no evidence that the specific use of the metering roller and the pool of adhesive would have resulted in a materially different end product. As such, it is believed that the references suggested the claimed invention where a hot melt adhesive was applied to a wooden substrate wherein the adhesive had the identified properties as the prior art suggested the same.

3. Claims 1-3, 4/1, 4/2, 4/3, 10-12, 15, and 16 are rejected under 35 U.S.C. 103(a) as being unpatentable over the references as set forth above in paragraph 2 further taken with Schaefer (newly cited).

The reference to Nichol as previously discussed provided for the rotation of the applicator roller at a speed different from the speed that the substrate being coated was fed past the applicator in order to provide a uniform coating to the substrate. The reference to Nichol was provided the adhesive from a glue pot 6 where a supply of glue was disposed and melted therein. The reference did not provide a means to feed the glue to the pot wherein there would have been a continuous supply of glue to the applicator and additionally has to provide the applicator roller within the glue pot as

there is no doctor for the glue and excess glue was required to be deposited back within the pot. It should be additionally noted that the open supply of adhesive material exposes all of the adhesive which is to be used in the coating operation to oxidation and the environment (which clearly is undesirable in the art). An alternative means for supplying the adhesive material to an applicator roller (where the adhesive was a hot melt adhesive and where the adhesive was applied from the underside of the substrate) was known in the art as evidenced by Schaefer.

Schaefer suggested that those skilled in the art of application of hot melt adhesive would have known to apply the adhesive material with an applicator roller 25 which applied to the adhesive to the underside of a web 14. The applicator roller 25 was disposed against a doctor roller 26 (a metering roller) and adhesive was supplied to the nip of the rollers from conduit 29 to form a pool of adhesive 27 between the doctor roller 26 and the applicator roller 25. In this arrangement, the adhesive is not continuously exposed to the environment but rather is continuously supplied to the pool on an as needed basis. Additionally, the reference suggested that the inclusion of the doctor roller allowed one to control the thickness of the adhesive disposed upon the applicator roller better. Clearly, supplying the adhesive to the applicator roller in Nichol with the system of Schaefer would have been obvious to those skilled in the art at least for these advantages. Applicant is referred to column 5, lines 1-17 of Schaefer. It would have been obvious to one of ordinary skill in the art at the time the invention was made to supply the adhesive to the applicator roller using the means defined by Schaefer

instead of a glue pot for the advantages identified above in the process of applying a hot melt adhesive to a substrate as set forth above in paragraph 2.

Applicant is referred to the Office action dated August 15, 2007 for a complete discussion of the dependent claims.

***Response to Arguments***

4. Applicant's arguments with respect to claims 1-4, 10-12, 15 and 16 have been considered but are moot in view of the new ground(s) of rejection.

The argument that the coating is applied upon the upper surface of the substrate is not persuasive as: (1) the term upper is a relative term (i.e. upper in comparison to what) where the hot melt in accordance with the references to Nichol and Schaefer were applied onto the exposed surface of the substrate on one side thereof where that side clearly could constitute the "upper" surface in its final use, and; (2) the admitted prior art expressly describes the self leveling effects imposed upon the adhesives used in the prior art process of coating with the applicator roller and the metering roller, Where "self-leveling" clearly would not take place if the coating was applied to the underside of the wood substrate as gravity would impart self leveling only upon an adhesive material applied on the upper surface of the substrate with the applicator rollers. The additional arguments that the prior art failed to teach the metering roller or the use of a pool of adhesive between the metering roller and the applicator roller are addressed above with respect to the newly cited reference to Schaefer.

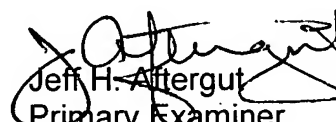
No claims are allowed.

**Conclusion**

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jeff H. Aftergut whose telephone number is 571-272-1212. The examiner can normally be reached on Monday-Friday 7:15-345 pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Richard Crispino can be reached on 571-272-1226. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

  
Jeff H. Aftergut  
Primary Examiner  
Art Unit 1791

JHA  
January 17, 2008